



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER OF PATENTS AND TRADEMARKS
Washington, D.C. 20231
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/015,045	12/11/2001	Ramesh Sundaram	S01.12-0881	7113

7590

07/09/2002

Deirdre Megley Kvale
WESTMAN CHAMPLIN & KELLY
International Centre, Suite 1600
900 South Second Avenue
Minneapolis, MN 55402-3319

EXAMINER

NOLAND, THOMAS

ART UNIT

PAPER NUMBER

2856

DATE MAILED: 07/09/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

12/0157045

Applicant(s)

Sundaram et al

Examiner

Tom M. W.

Group Art Unit

2852

—The MAILING DATE of this communication appears on the cover sheet beneath the correspondence address—

P riod for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, such period shall, by default, expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).

Status

- ☒ Responsive to communication(s) filed on 4/29/02
- ☐ This action is FINAL.
- ☐ Since this application is in condition for allowance except for formal matters, **prosecution as to the merits is closed** in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 1 1; 453 O.G. 213.

Disposition of Claims

- ☒ Claim(s) 1-20 is/are pending in the application.
- Of the above claim(s) 1-10 is/are withdrawn from consideration.
- ☐ Claim(s) _____ is/are allowed.
- ☒ Claim(s) 11-18 is/are rejected.
- ☒ Claim(s) 19-20 is/are objected to.
- ☐ Claim(s) _____ are subject to restriction or election requirement.

Application Papers

- ☐ See the attached Notice of Draftsperson's Patent Drawing Review, PTO-948.
- ☐ The proposed drawing correction, filed on _____ is ☐ approved ☐ disapproved.
- ☐ The drawing(s) filed on _____ is/are objected to by the Examiner.
- ☒ The specification is objected to by the Examiner.
- ☒ The oath or declaration is objected to by the Examiner.

Pri rity under 35 U.S.C. § 119 (a)-(d)

- ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).
- ☐ All ☐ Some* ☐ None of the CERTIFIED copies of the priority documents have been received.
- ☐ received in Application No. (Series Code/Serial Number) _____.
- ☐ received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

*Certified copies not received: _____

Attachment(s)

- ☒ Information Disclosure Statement(s), PTO-1449, Paper No(s). included with 12/11/01
- ☒ Notice of Reference(s) Cited, PTO-892
- ☐ Notice of Draftsperson's Patent Drawing Review, PTO-948
- ☐ Interview Summary, PTO-413
- ☐ Notice of Informal Patent Application, PTO-152
- ☐ Other _____

Office Action Summary

Art Unit: 2856

1. The amendment filed April 29, 2002 has been entered.
2. Applicant's election without traverse of the invention of group 3, claims 11-20 in Paper No. 3, filed April 29, 2002 is acknowledged.
3. Claims 19-20 are objected to under 37 CFR 1.75(c), as being of improper dependent form for failing to further limit the subject matter of a previous claim. Applicant is required to cancel the claim(s), or amend the claim(s) to place the claim(s) in proper dependent form, or rewrite the claim(s) in independent form. It is not seen how a glide head sliced from the wafer of claim 11 would have further limit the subject matter of claim 11 directed to the wafer per se. Additionally such a sliced wafer would not meet the contoured to form air bearing surfaces of a plurality of glide heads limitation of claim 11 since only one glide head is formed and the claim does not contain all the limitations of base claim 11 as required. In view of this objection claims 19-20 have not been further treated on the merits.
4. Claims 1-10 are withdrawn from further consideration by the examiner, 37 CFR 1.142(b) as being drawn to a non-elected invention. Election was made **without** traverse in Paper No. 3.
5. The restriction requirement is made final. Applicant is requested to cancel claims 1-10 when claims 19-20 are also cancelled.
6. The oath or declaration is defective. A new oath or declaration in compliance with 37 CFR 1.67(a) identifying this application by application number and filing date is required. See MPEP §§ 602.01 and 602.02.
The oath or declaration is defective because:
The full name of each inventor (family name and at least one given name together with any initial) has not been set forth.

Art Unit: 2856

Inventor Yao apparently has the middle initial H.

7. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

8. The following title is suggested: Wafer Having Surface Contoured to Form Air Bearing Surfaces of Plurality of Glide Heads.

9. The disclosure is objected to because of the following informalities: On page 4, line 31 after "using" --- a --- should be inserted.

On page 6, line 6 -- Tucson --- is misspelled.

On page 9, line 33 -09/178,580 --- should be inserted in the blank.

On page 10, line 1 "thermal" should be deleted.

10. Claims 15-16 and 18 are objected to because of the following informalities: In line 3 of claims 15-16 "1 μ inch" should be -- 1 μ inch ---, In claim 18, line 3 "0.5 μ inch" should be -- 0.5 μ inch ---. Appropriate correction is required.

11. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

12. Claims 11-13, 15-16 and 18 are rejected under 35 U.S.C. 102(e) as being anticipated by Smith, Jr. US patent no. 6, 112,401.

Note especially col. 3, lines 49-67; col. 4, lines 41-43 and col. 11, lines 5-18.

Art Unit: 2856

13. Claims 11-13 and 15-18 are rejected under 35 U.S.C. 102(b) as being anticipated by Aylwin et al US 5,452,166 cited on the IDS.

Note especially the abstract and cols. 6, line 44-col. 8, line 7.

14. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

15. Claim 14 is rejected under 35 U.S.C. 103(a) as being unpatentable over (Smith, Jr. or Aylwin et al) in view of (Burger et al US 6,233,119 or the known suitable wafers disclosed on page 5, lines 18-23 of the specification herein).

Smith, Jr. and Aylwin et al does not disclose the use of aluminum oxide/titanium carbide wafers but such is a known wafer material for similar such systems as evidenced by Burger et al in col. 5, lines 13-16 or applicant's own disclosure referred to above. Use of such would aid in fabrication.

16. Claim 17 is rejected under 35 U.S.C. 103(a) as being unpatentable over (Smith Jr. or Aylwin et al) in view of (Voldman et al US 5,771,571 cited in the IDS or Voldman et al US 5,559,051 cited in the IDS).

Smith Jr. and Aylwin et al do not disclose mounting the transducer on a surface opposite the air bearing surface. However, such is a known technique in similar such systems as evidenced by Voldman et al 5,771,571 especially in fig. 5 and col. 5, line 58-col. 6, line 52 therein. Such a

Art Unit: 2856

disposition would allow the transducer to be better protected. Voldman et al 5,559,051 provides similar teachings.

17. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. The cited references show sliders and/or glide heads.

18. Burga et al US 6,338,269 B1; Sundaram et al US 2002/0018508 A1 (publication of 09/176,580 cited on page 9); and Lewis et al US 2001/0046108 A1 (publication of 09/808,462), all not prior art, disclose sliders or glide heads but do not claim a wafer having a surface contoured to form air bearing surfaces of a plurality of glide heads. US application numbers 09/176,580 and 09/808,462 should maintain this claim difference.

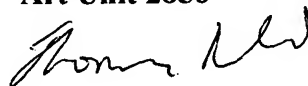
19. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tom Noland whose telephone number is (703) 305-4765. The examiner can normally be reached on weekdays from 9:00 to 5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mr. Hezron E. Williams, can be reached on (703) 305-4705.

The fax phone number for the organization where this application or proceeding is assigned is (703) 308-7722.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0956.

7/8/02
Thomas P. Noland
Primary Examiner
Art Unit 2856



Noland/ds
06/25/02